

WHAT IS CLAIMED IS:

5        1. A system for reformatting contents in a wireless Internet site which converts the wireless Internet site to conform to the form of a proper tag according to the type of a browser of a wireless terminal which accesses the wireless Internet site for transmission to the wireless terminal, comprising:

10        a message-receiving means adapted to receive a message from the wireless terminal and check a language supported by the wireless terminal from the received message to store it therein;

15        an external processor adapted to provide contents over a wireless Internet;

20        an external processor-communicating means adapted to determine which Web page has been called from the received message to call a corresponding external processor and to allow contents data processed by and outputted from the called external processor to be received therethrough;

25        a message-checking means adapted to determine whether or not the contents data inputted thereto through the external processor-communicating means from the external processor is configured to conform to a meta tag as a pre-defined language;

30        a contents-reformatting means adapted to convert the contents data into a language supported by the wireless terminal if it is determined that the contents data is configured with the meta tag; and

35        a message-transmitting means adapted to transmit converted contents applied thereto from the contents-reformatting means to the wireless terminal.

40        2. The system according to claim 1 wherein the contents-reformatting means further comprises a tag-converting module adapted to convert an input message identified by the message-checking means into contents of an XML-based meta tag (MML) type and then convert the converted MML-type contents into contents of type which can be recognized by the wireless terminal, and a language-translating module adapted to analyze a header portion of the contents and a header portion of the message requested by the wireless terminal to identify a national language used to draw up the contents and translate the contents into a national language supported by the wireless terminal according to a result of the identification of the used national language.

45        3. The system according to claim 1 wherein the contents-reformatting means further comprises a tag-

converting module adapted to convert an input message identified by the message-checking means into an XML-based meta tag (MML) type and then convert the converted MML-type contents into a contents type which can be recognized by the wireless terminal, and a multimedia-converting module adapted to identify a used multimedia form using the header portion of the request message of the wireless terminal and convert multimedia contents inputted to the contents-reformatting means from the external processor into a multimedia form supported by the wireless terminal according to a result of the identification of the used multimedia form.

4. The system according to claim 1 wherein the contents-reformatting means further comprises a tag-converting module adapted to convert an input message identified by the message-checking means into contents of an XML-based meta tag (MML) type and then convert the converted MML-type contents into contents of type which can be recognized by the wireless terminal, a language-translating module adapted to analyze a header portion of the contents and a header portion of the message requested by the wireless terminal to identify a used national language and translate the contents into a national language supported by the wireless terminal according to a result of the identification of the used national language, and a multimedia-converting module adapted to identify a used multimedia form using the header portion of the request message of the wireless terminal and convert multimedia contents inputted to the contents-reformatting means from the external processor into a multimedia form supported by the wireless terminal according to a result of the identification of the used multimedia form.

5. A method for reformatting contents in a wireless Internet site which converts the wireless Internet site to conform to the form of a proper tag according to the type of a browser of a wireless terminal which accesses the wireless Internet site for transmission to the wireless terminal, comprising the steps of:

receiving a message requesting a provision of a Web page from a wireless terminal;

identifying which protocol is used in the wireless terminal;

calling a corresponding external processor on the basis of various factors inputted to a contents-reformatting system from the wireless terminal;

allowing the called corresponding external processor

to process associated contents on the basis of the various factors, and then to transmit the resultant contents with one of a plurality of Internet languages to an external processor-communicating means;

5 determining whether or not the resultant contents configured with a predetermined language that has been inputted to the message-checking means from the called external processor through the external processor-communicating means conforms to a grammar of each language according to a DTD document defined by a message-checking means when the resultant contents are a general text;

10 identifying a used protocol using a contents type of an input message applied to the message-checking means from the called external processor;

15 determining whether or not a protocol of the wireless terminal is identical with that of contents of the input message;

20 loading a style sheet for converting the protocol of the contents into that of MML type if it is determined that the protocol of the wireless terminal is not identical with that of contents of the input message;

25 converting the received contents into those of the MML type on the basis of the style sheet;

30 loading a style sheet for converting a protocol of the MML type into that of the wireless terminal;

35 converting the MML type protocol into a target protocol on the basis of the style sheet; and

transmitting completed contents to the wireless terminal requesting the provision of the Web page.

6. A method for reformatting contents in a wireless Internet site which converts the wireless Internet site into a proper language according to the type of a browser of a wireless terminal which had accessed the wireless Internet site for transmission to the wireless terminal, comprising the steps of:

receiving a message requesting a provision of a Web page from a wireless terminal;

40 identifying which protocol is used in the wireless terminal;

calling a corresponding external processor on the basis of various factors inputted to a contents-reformatting system from the wireless terminal;

45 allowing the called corresponding external processor to process associated contents on the basis of the various factors, and then to transmit the resultant contents with one of a plurality of Internet languages to an external processor-communicating means;

5 determining whether or not the resultant contents configured with a Internet language conform to a grammar of each language according to a DTD document defined by the message-checking means when the message-checking means receives the resultant contents from the called external processor through the external processor-communicating means;

10 identifying a national language used in the wireless terminal by using an HTTP header of an input message of the wireless terminal;

15 determining whether or not there is an element for identifying a national language used to draw up the message requested by the wireless terminal or the received resultant contents in a header of the request message of the wireless terminal or a header of the received resultant contents;

20 loading a language-converting form basically set in an environmental parameter if it is determined that there is not an element for identifying the used national language;

25 determining whether or not a national language supported by the wireless terminal is identical with that used to draw up the contents if it is determined that there is an element for identifying the used national language;

30 translating the contents into a national language supported by the wireless terminal if it is determined that the national language supported by the wireless terminal is not identical with that used to draw up the contents;

35 identifying a protocol used in the wireless terminal using a contents type of the input message if it is determined that the national language supported by the wireless terminal is identical with that used to draw up the contents;

40 determining whether or not a protocol of the wireless terminal is identical with that of contents of the input message;

45 loading a style sheet for converting the protocol of the contents into that of MML type if it is determined that the protocol of the wireless terminal is not identical with that of contents of the input message;

converting the received contents into those of the MML type on the basis of the style sheet;

loading a style sheet for converting a protocol of the MML type into that of the wireless terminal;

45 converting the MML type protocol into a target protocol on the basis of the style sheet; and

transmitting completed contents to the wireless terminal requesting the provision of the Web page.

7. A method for reformatting contents in a wireless Internet site which converts the wireless Internet site into a proper language according to the type of a browser of a wireless terminal which had accessed the wireless Internet site for transmission to the wireless terminal, comprising the steps of:

receiving a message requesting a provision of a Web page from a wireless terminal;

identifying which protocol is used in the wireless terminal;

calling a corresponding external processor on the basis of various factors inputted to a contents-reformatting system from the wireless terminal;

allowing the called corresponding external processor to process associated contents on the basis of the various factors, and then to transmit the resultant contents with one of a plurality of Internet languages to an external processor-communicating means;

determining whether or not the resultant contents configured with a Internet language conforms to a grammar of each language according to a DTD document defined by the message-checking means when the message-checking means receives the resultant contents from the called external processor through the external processor-communicating means;

identifying a protocol used in the wireless terminal using a contents type of an input message of the wireless terminal;

determining whether or not a protocol of the wireless terminal is identical with that of contents of the input message;

loading a style sheet for converting the protocol of the contents into that of MML type if it is determined that the protocol of the wireless terminal is not identical with that of contents of the input message;

converting the received contents into the those of MML type on the basis of the style sheet;

loading a style sheet for converting a protocol of the MML type into that of the wireless terminal;

converting the MML type protocol into a target protocol on the basis of the style sheet;

identifying a national language used in the wireless terminal by using an HTTP header of the input message;

determining whether or not there is an element for identifying a national language used to draw up the message requested by the wireless terminal or the received resultant contents in a header of the request message of

the wireless terminal or a header of the received resultant contents;

5 loading a language-converting form basically set in an environmental parameter if it is determined that there is not an element for identifying the used national language;

10 determining whether or not a national language supported by the wireless terminal is identical with that used to draw up the contents if it is determined that there is an element for identifying the used national language;

15 translating the contents into a national language supported by the wireless terminal if it is determined that the national language supported by the wireless terminal is not identical with that used to draw up the contents; and

20 transmitting completed contents to the wireless terminal requesting the provision of the Web page if it is determined that the national language supported by the wireless terminal is identical with that used to draw up the contents.

25 8. The method according to any one of claims 5 to 7 wherein the step of allowing the called corresponding external processor to process associated contents, and then to transmit the resultant contents with one of a plurality of Internet languages to the external processor-communicating means further comprises the steps of:

30 determining whether or not the resultant contents configured with a language that have been transmitted to the external processor-communicating means are general texts;

35 identifying a multimedia form used in the wireless terminal by using an HTTP header of an input message of the wireless terminal if it is determined that the resultant contents transmitted to the external processor-communicating means are not general texts;

40 determining whether or not a multimedia form of the wireless terminal is identical with that of the resultant contents;

45 converting multimedia contents inputted to the message-checking means from the external processor to conform to a multimedia form of the wireless terminal if it is determined that the multimedia form of the wireless terminal is not identical with that of the resultant contents.